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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/762,523	09/762,523 02/01/2001 Hideaki Machida		1022-01	4791	
35811 75	90 04/19/2004	EXAMINER			
	IENT OF PIPER RUDN	SIMONE, CA	SIMONE, CATHERINE A		
ONE LIBERTY 1650 MARKET	PLACE, SUITE 4900	ART UNIT	PAPER NUMBER		
PHILADELPHI			1772		

DATE MAILED: 04/19/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

			N-	A == 1: == = 4 ( = )				
Office Action Summary		Application	n No.	Applicant(s)				
		09/762,523	3	MACHIDA ET AL.				
		Examiner		Art Unit				
		Catherine S		1772				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply								
THE - Exte after - If the - If NO - Failt Any	ORTENED STATUTORY PERIOD FOR REPL'MAILING DATE OF THIS COMMUNICATION. nsions of time may be available under the provisions of 37 CFR 1.1 SIX (6) MONTHS from the mailing date of this communication. Period for reply specified above is less than thirty (30) days, a repl or period for reply is specified above, the maximum statutory period or the toreply within the set or extended period for reply will, by statute reply received by the Office later than three months after the mailing ed patent term adjustment. See 37 CFR 1.704(b).	I36(a). In no even ly within the statut will apply and will e, cause the applic	t, however, may a reply be timory minimum of thirty (30) days expire SIX (6) MONTHS from ation to become ABANDONEI	nely filed s will be considered timely the mailing date of this co O (35 U.S.C. § 133).				
Status								
1)	Responsive to communication(s) filed on <u>02 F</u>	ebruary 2004	<b>4</b> .					
, <u> </u>		s action is no						
3)	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Disposit	ion of Claims							
5)□ 6)⊠ 7)□	<ul> <li>4) Claim(s) 1 and 3 is/are pending in the application.</li> <li>4a) Of the above claim(s) is/are withdrawn from consideration.</li> <li>5) Claim(s) is/are allowed.</li> <li>6) Claim(s) 1 and 3 is/are rejected.</li> <li>7) Claim(s) is/are objected to.</li> <li>8) Claim(s) are subject to restriction and/or election requirement.</li> </ul>							
Applicat	ion Papers							
9)[	The specification is objected to by the Examine	er.						
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.								
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).								
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.								
Priority (	under 35 U.S.C. § 119							
a)i	Acknowledgment is made of a claim for foreign All b) Some * c) None of:  1. Certified copies of the priority document  2. Certified copies of the priority document  3. Copies of the certified copies of the priority document  application from the International Bureau  See the attached detailed Office action for a list	ts have been ts have been rity documer u (PCT Rule	received. received in Applications have been received 17.2(a)).	on No ed in this National	Stage			
Attachmen	t(s)				X-			
	e of References Cited (PTO-892)	4	4) Interview Summary	(PTO-413)				
2) Notice 3) Inform	ee of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date		Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	te	-152)			

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#### DETAILED ACTION

### Claim Rejections - 35 USC § 112

- 1. The following is a quotation of the second paragraph of 35 U.S.C. 112:
  - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 2. Claims 1 and 3 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The recitation "a plurality of repetitive patterns" is deemed vague and indefinite. What is meant by "repetitive patterns"? What kind or type of patterns? Clarification is requested.

## Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 4. Claims 1 and 3 are rejected under 35 U.S.C. 102(b) as being anticipated by Sado et al. (US 4,971,748).

Sado et al. discloses a polyimide molding of thermoplastic aromatic polyimide resin, comprising a wall defining an opening at one end and closed at an opposite end (Fig. 1, #11), and having a depth therebetween (see col. 6, line 57), wherein the wall thickness is between 0.001 mm and 0.5 mm (see col. 5, lines 43-45), wherein the thermoplastic aromatic polyimide resin has

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a glass transition temperature between 200°C and 350°C (2, lines 36-40) and has a degree of elongation at break of from 50 to 2,000% at its glass transition temperature (see col. 2, lines 40-42), wherein the polyimide molding has a plurality of repetitive patterns (see col. 2, line 43-45; for example, a corrugated sheet would have a plurality of repetitive patterns), and the molding has a longest major axis between 200 and 10,000 mm in length (see col. 6, line 58) with a depth between 0.5 and 8,000 mm (see col. 6, line 57). Regarding **claim 3**, note the wall thickness falls between 0.01 and 0.2 mm (see col. 5, lines 43-45) and the longest major axis falls between 200 and 5000 mm in length (see col. 6, line 58) with a depth falling between 1.0 and 2000 mm (see col. 6, line 57).

### Claim Rejections - 35 USC § 103

- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 6. Claims 1 and 3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sado et al. (US 4,971,748) in view of Voaden et al. (EP 0 392 674).

Sado et al. discloses a polyimide molding of thermoplastic aromatic polyimide resin, comprising a wall defining an opening at one end and closed at an opposite end (Fig. 1, #11), and having a depth therebetween (see col. 6, line 57), wherein the wall thickness is between 0.001 mm and 0.5 mm (see col. 5, lines 43-45), wherein the thermoplastic aromatic polyimide resin has a glass transition temperature between 200°C and 350°C (2, lines 36-40) and has a degree of

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elongation at break of from 50 to 2,000% at its glass transition temperature (see col. 2, lines 40-42), and a longest major axis between 200 and 10,000 mm in length (see col. 6, line 58) with a depth between 0.5 and 8,000 mm (see col. 6, line 57). However, Sado et al. fails to disclose a plurality of repetitive patterns. Voaden et al. teaches that it is old and well-known in the art to have a plurality of repetitive patterns (Fig. 1c, #6) for the purpose of producing a shaped sheet of polyimide. Therefore, it would have been obvious to one of ordinary skill in the art at the time the applicant's invention was made to have provided the polyimide sheet in Sado et al. with a plurality of repetitive patterns as suggested by Voaden et al. in order to produce a shaped sheet of polyimide.

Regarding **claim 3**, note the wall thickness falls between 0.01 and 0.2 mm (see col. 5, lines 43-45) and the longest major axis falls between 200 and 5000 mm in length (see col. 6, line 58) with a depth falling between 1.0 and 2000 mm (see col. 6, line 57).

# Response to Arguments

7. Applicant's arguments with respect to claims 1 and 3 have been considered but are moot in view of the new ground(s) of rejection. However, in response to Applicant's argument that "Sado does not disclose, teach or suggest a plurality of repetitive patterns as shown below," it is to be noted that there is no support found in the specification for the drawing given in the Applicant's remarks showing the plurality of repetitive patterns.

There is no acknowledgement in the specification as to what the repetitive patterns are.

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#### Conclusion

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Catherine Simone whose telephone number is (571)272-1501. The examiner can normally be reached on 9:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Pyon can be reached on (571) 272-1498. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Catherine Simone Examiner Art Unit 1772 April 12, 2004

HAROLD PYON SUPERVISORY PATENT EXAMINER

4/14/04